SUB1>

8. (Once Amended) A transparent conductive multi-layer structure, comprising: a substrate overlaid with a conductive layer containing fine conductive particles, said multi-layer structure having a surface resistivity of 10 - $10^3 \Omega / \square$ and a visible light transmittance of at least 70%.

9. (Once Amended) The transparent conductive multi-layer structure according to claim 8, wherein the fine conductive particles are the fine particles of indium-tin oxide.

REMARKS

Favorable reconsideration of this application, in light of the present amendments and following discussion, is respectfully requested.

Claims 1-5, and 8-13 are pending; Claims 1, 2, 8, and 9 have been amended; and no new claims have been added or cancelled. Applicants respectfully submit that no new matter has been added by the present amendment.

In the outstanding Office Action, the disclosure was objected to; Claims 2 and 9 were objected to for informalities; Claims 1-5 and 8-13 were rejected under 35 U.S.C. § 112, second paragraph, as indefinite; Claims 8-10 and 12 were rejected under 35 U.S.C. § 112(b) as anticipated by Kawata et al. (U.S. Pat. No. 5,662,962, hereafter Kawata); Claim 8-10 and 12 were rejected under 35 U.S.C. § 102(b) as anticipated by Japanese Patent Publication No. 08-1990962 to Masahito et al. (hereafter Masahito); Claims 1-5 were rejected under 35 U.S.C. § 103(a) as unpatentable of Kawata in view Hieda et al. (U.S. Pat. No. 6,398,900, hereafter Hieda); Claim 11 was rejected under 35 U.S.C. § 103(a) as unpatentable over Kawata as applied to Claims 8-10 and 12, and further in view of Anzaki et al. (U.S. Pat. No. 6,316,110, hereafter Anzaki); Claim 13 was rejected under 35 U.S.C. § 103(a) as unpatentable over

Kawata as applied to Claims 8-10 and 12 above, and further in view of Murata et al. (U.S. Pat. No., 5,886,819, hereafter Murata); Claims 1-3 and 5 were rejected under 35 U.S.C. § 103(a) as unpatentable over Masahito in view of Hieda; Claim 4 was rejected under 35 U.S.C. § 103(a) as unpatentable over Masahito in view of Hieda as applied to Claims 1-3 and 5 above, and further in view of Anzaki; Claim 11 was rejected under 35 U.S.C. § 103(a) as unpatentable over Masahito as applied to Claims 8-10 and 12 above, and further in view of Anzaki; and Claim 13 was rejected under 35 U.S.C. § 103(a) as unpatentable over Masahito as applied to Claims 8-10 and 12 above, and further in view of Anzaki; and Claims 8-10 and 12, and further in view of Murata.

With regard to the objection to the disclosure, Applicants respectfully traverse this objection. The Office Action states at page 2, paragraph 2, that the disclosure must be corrected for disclosing alternative embodiments. However, Applicants respectfully submit that the description of alternative embodiments as objected to at page 18 and page 19 are permitted to be different from each other, as they are alternative embodiments. Applicants respectfully note that page 8, lines 1-6, of the specification describes that at least two alternative embodiments are presented in the application. Accordingly, Applicants respectfully request that this objection be withdrawn.

In response to the objection to Claims 2 and 9 for informalities, Applicants respectfully submit that this objection has been overcome. The parenthetical subject matter has been deleted from these claims. Accordingly, Applicants submit that this objection should be withdrawn.

In response to the rejection of Claims 1-5 and 8-13 under 35 U.S.C. § 112, second paragraph, that rejection is traversed for the reasons below. Independent Claims 1 and 8 have

been amended to recite "surface resistivity." Applicants therefore respectfully submit that this rejection should be withdrawn.

With regard to the rejection of Claims 8-10 and 12 under 35 U.S.C. § 102(b) as anticipated by <u>Kawata</u>, that rejection is traversed for the reasons discussed below.

Claim 8, from which Claims 9, 10, and 12, depend, recites: "a substrate overlaid with a conductive layer containing fine conductive particles, said multi-layer structure having a surface resistivity of $10 - 10^3 \Omega/\Box$ and a visible light transmittance of at least 70%" (emphasis added).

The Office Action states that <u>Kawata</u> discloses in Tables 1 and 3 a structure having the claimed surface resistivity and visible light transmittance. However, <u>Kawata</u> actually describes in Tables 1 and 3 that an overcoat-baked device having a surface resistivity of 1.3 k Ω / \square (which is greater than $10\text{-}10^3$ k Ω / \square) may have a whole ray transmittance of 93.4%. <u>Kawata</u> therefore does not disclose or suggest that finished product may be a "substrate overlaid with a conductive layer containing fine conductive particles, said multi-layer structure *having a* surface resistivity of $10 - 10^3$ Ω / \square and a visible light transmittance of at least 70%."

Accordingly, as <u>Kawata</u> fails to disclose or suggest the limitations recited in pending independent Claim 8, Applicants respectfully submit that Claim 8 patentably distinguishes over <u>Kawata</u>. Likewise, pending dependent Claims 9, 10, and 12 patentably distinguish over <u>Kawata</u> from for the reasons above-noted with respect to Claim 8, from which these claims depend.

In response to the rejection of Claims 8-10 and 12 under 35 U.S.C. § 102(b) as anticipated by Masahito, Applicants respectfully traverse this rejection for the reasons discussed below.

As noted above, Claim 8 recites: "a substrate overlaid with a conductive layer containing fine conductive particles, said multi-layer structure having a surface resistivity of 10 - $10^3 \Omega/\Box$ and a visible light transmittance of at least 70%" (emphasis added).

MPEP § 2131 states: "to anticipate a claim, the reference must teach every element of the claim." As admitted in the Office Action at page 4, paragraph 8, "Masahito does not disclose the visible light transmittance" Therefore, because the Office Action admits that the cited reference fails to disclose one of the elements recited in pending independent Claim 8, Applicants respectfully submit that the Office Action has failed to satisfy its burden for an anticipation rejection.

The Office Action infers at page 4, paragraph 8, that the Applicants' claimed features are inherent from the description of Masahito. However, MPEP § 2112 states: "The fact that a certain result or characteristic may occur or be present in the prior art is not sufficient to establish the inherency of that result or characteristic" (emphasis in original). Moreover, "[t]he mere fact that a certain thing may result from a given set of circumstances is not sufficient" In re Robertson, 169 F.3d 743, 745, 49 USPQ.2d 1949, 1950-51 (Fed. Cir. 1999). In order to support an inherency rejection, according to MPEP § 2112, the Office Action must provide either a factual basis or a technical basis for the rejection. In this case, Applicants respectfully submit that the Office Action has not satisfied its burden of support for an inherency rejection.

Accordingly, Applicants respectfully submit that Claim 8 patentably distinguishes over Masahito. Similarly, dependent Claims 9, 10, and 12 are considered to patentably distinguish over Masahito for the reasons above-noted with respect to Claim 8, from which these claims depend. Applicants therefore respectfully request that this rejection of Claims 8-10 and 12 be withdrawn.

In response to the rejection of Claims 1-5 under 35 U.S.C. § 103(a) as unpatentable over <u>Kawata</u> in view of <u>Hieda</u>, Applicants respectfully submit that the Office Action has failed to provide a *prima facie* case of obviousness.

Like Claim 8, independent Claim 1 recites a "multi-layer structure having a surface resistivity of 10 - 10³ Ω/□ and a visible light transmittance of at least 70%" (emphasis added).

As noted above, Kawata fails to disclose or suggest this limitation.

Applicants respectfully submit that <u>Hieda</u> fails to remedy this defect. In fact, <u>Hieda</u> describes that the electromagnetic wave shield layer has a surface resistance (resistivity) in a range from 0.5 to 20 Ω/\Box .³ <u>Hieda</u> further describes that a metal having a surface resistance (resistivity) of no greater than 1 Ω/\Box might be used instead.⁴ In light of this description, Applicants respectfully submit that <u>Hieda</u> fails to remedy the deficiencies of <u>Kawata</u>.

Because neither reference discloses or suggests the limitations recited in independent Claim 1, Applicants respectfully submit that pending Claim 1 patentably distinguishes over Kawata and Hieda, either alone or in combination. Likewise, pending dependent Claims 2-5 patentably distinguish over the references, either alone or in combination, for at least the reasons above-noted with respect to Claim 1, from which these claims depend. Applicants therefore respectfully request that this rejection be withdrawn.

Moreover, Applicants respectfully submit that no basis for the proposed combination is present in the teachings of either <u>Kawata</u> or <u>Hieda</u>. The Office Action fails to point to any teachings in either reference to support the proposed combination. Accordingly, Applicants

³Hieda, col. 5, lines 10-13.

⁴<u>Id.</u> at lines 13-15.

respectfully submit that the proposed combination of <u>Kawata</u> and <u>Hieda</u> is based solely upon hindsight reconstruction.

With regard to the rejection of Claim 11 under 35 U.S.C. § 103(a) as unpatentable over Kawata in view of Anzaki, Applicants respectfully submit that the Office Action has failed to provide a prima facie case of obviousness.

As noted above, Claim 8, from which Claim 11 depends, recites: "a substrate overlaid with a conductive layer containing fine conductive particles, said multi-layer structure having a surface resistivity of $10 - 10^3 \Omega/\Box$ and a visible light transmittance of at least 70%" (emphasis added).

As further noted above, <u>Kawata</u> fails to disclose or suggest the limitations recited in pending Claim 8.

Anzaki fails to remedy the deficiencies above-noted with respect to Kawata. Anzaki relates to an electromagnetic wave filter for a plasma display panel. In fact, Anzaki describes that the multi-layered electromagnetic shield film might have a sheet resistance of 3.0 Ω or less.⁵ As this description indicates, Anzaki fails to disclose or suggest "a substrate overlaid with a conductive layer containing fine conductive particles, said multi-layer structure having a surface resistivity of $10 - 10^3 \Omega$ and a visible light transmittance of at least 70%" (emphasis added).

Because neither <u>Kawata</u> nor <u>Anzaki</u> discloses or suggests the limitations recited in pending independent Claim 8, from which Claim 11 depends, Applicants respectfully request that the rejection of Claim 11 be withdrawn.

⁵Anzaki, col. 9, lines 40-43.

In response to the rejection of Claim 13 under 35 U.S.C. § 103(a) as unpatentable over Kawata in view of Murata, Applicants respectfully submit that the Office Action has failed to provide a *prima facie* case of obviousness.

Claim 8, from which Claim 13 depends, recites: "a substrate overlaid with a conductive layer containing fine conductive particles, said multi-layer structure having a surface resistivity of $10 - 10^3 \Omega/\Box$ and a visible light transmittance of at least 70%" (emphasis added).

As previously noted, <u>Kawata</u> fails to disclose or suggest the limitations recited in Claim 8.

Murata relates to an antiglare material and polarizing film. Murata, however, does not describe a multi-layer substrate having any specified surface resistivity. Specifically, Murata does not disclose or suggest "a substrate overlaid with a conductive layer containing fine conductive particles, said multi-layer structure having a surface resistivity of $10 - 10^3 \Omega/\Box$ and a visible light transmittance of at least 70%" (emphasis added).

Accordingly, as neither <u>Kawata</u> nor <u>Murata</u> discloses or suggests the limitations recited in Claim 8, from which Claim 13 depends, Applicants respectfully request that the rejection of Claim 13 be withdrawn.

Applicants further respectfully submit that there is no basis in the teaching of either Kawata or Murata to support the proposed combination. Certainly, the Office Action fails to point to any specific teachings in either reference in support of the combination. Applicants therefore respectfully submit that the proposed combination of Kawata and Murata is based solely upon hindsight reconstruction.

In response to the rejection of Claims 1-3 and 5 under 35 U.S.C. § 103(a) as unpatentable over <u>Masahito</u> in view of <u>Hieda</u>, Applicants respectfully submit that the Office Action has failed to satisfy the burden of *prima facie* obviousness.

As noted above with respect to Claim 8, and as admitted in the Office Action, Masahito fails to disclose or suggest the visible light transmittance, and consequently fails to disclose or suggest a "multi-layer structure having a surface resistivity of $10 - 10^3 \Omega/\Box$ and a visible light transmittance of at least 70%," as recited in pending independent Claim 1.

As further noted above, <u>Hieda</u> also fails to disclose or suggest the limitations recited in pending independent Claim 1.

Accordingly, as neither <u>Masahito</u> nor <u>Hieda</u> discloses or suggests the limitations recited in pending independent Claim 1, either alone or in combination, Applicants respectfully submit that the Office Action has failed to provide a *prima facie* case of obviousness with respect to Claim 1. Consequently, Applicants respectfully request that this rejection be withdrawn.

Moreover, dependent Claims 2, 3, and 5 patentably distinguish over <u>Masahito</u> and <u>Hieda</u>, either alone or in combination, for at least the reasons above-noted with respect to Claim 1, from which these claims depend.

With regard to the rejection of Claim 4 under 35 U.S.C. § 103(a) as unpatentable over Masahito in view of Hieda and further in view of Anzaki, Applicants respectfully submit that the Office Action has not provided a *prima facie* case of obviousness. Claim 4 depends from Claim 1. As noted above, Claim 1 recites a "multi-layer structure having a surface resistivity of $10 - 10^3 \Omega/\Box$ and a visible light transmittance of at least 70%."

As further noted above, neither <u>Masahito</u> nor <u>Hieda</u> discloses or suggests these limitations.

Anzaki, as noted above with respect to Claim 8, fails to disclose or suggest a "multi-layer structure having a surface resistivity of $10 - 10^3 \Omega/\Box$ and a visible light transmittance of at least 70%" (emphasis added).

Therefore, as none of <u>Masahito</u>, <u>Hieda</u>, or <u>Anzaki</u>, either alone or in combination, discloses or suggests the limitations recited in pending independent Claim 1, from which Claim 4 depends, Applicant respectfully requests that this rejection be withdrawn.

Applicants also respectfully submit that the Office Action's proposed combination is not supported by the teachings of any of these three references. The Office Action certainly fails to reference specific points in the teachings of these references to support the proposed combination. Applicants therefore respectfully submit that the proposed combination of Masahito, Hieda, and Anzaki is based solely upon hindsight.

In response to the rejection of Claim 11 as unpatentable over <u>Masahito</u> in view of <u>Anzaki</u>, Applicants respectfully submit that the Office Action has not provided a *prima facie* case of obviousness. Claim 11 depends from Claim 8.

As noted above, neither <u>Masahito</u> nor <u>Anzaki</u> discloses or suggests the limitations recited in pending independent Claim 8. Accordingly, Applicants request that the rejection of Claim 11 be withdrawn for the reasons earlier noted with respect to Claim 8.

Applicants further respectfully submit that there is no basis in the teachings of either

Masahito or Anzaki to support the proposed combination. Certainly, the Office Action fails to

point to any specific teachings in either reference in support of the applied combination.

Consequently, Applicants submit that the proposed combination is solely based upon hindsight.

With regard to the rejection of Claim 13 under 35 U.S.C. § 103(a) as unpatentable over

Masahito in view of Murata, Applicants respectfully submit that the Office Action has again

failed to provide a prima facie case of obviousness.

As earlier noted, Claim 13 depends from Claim 8. As further discussed above, neither

Masahito nor Murata discloses or suggests the limitations recited in pending Claim 8.

Applicants therefore respectfully request that the rejection of Claim 13 be withdrawn for the

reasons above-noted with respect to Claim 8, from which Claim 13 depends.

Moreover, Applicants respectfully submit that there is no basis in the teachings of these

references to support the proposed combination. The Office Action fails to cite to any specific

teachings in either Masahito or Murata to support the proposed combination. Applicants

therefore respectfully submit that the proposed combination is based solely upon hindsight.

Consequently, in light of the foregoing discussion and present amendments, Applicant

respectfully submits that the pending claims are in condition for immediate allowance. An

early and favorable action is therefore respectfully requested.

Respectfully submitted,

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Serial No: 09/859,512

Amendment Filed On: 02/06/03

IN THE SPECIFICATION

Please amend the specification as follows:

At page 8, lines 1-6, please delete the paragraph and substitute therefor:

The transparent conductive multi-layer structure of the invention [is what either comprising] may comprise a substrate overlaid with a support which in turn is overlaid with a conductive layer containing fine conductive particles (first type), or [comprising] it may comprise a substrate overlaid with a conductive layer containing fine conductive particles (second or transferable type).

At page 15, line 17 through page 16, line 5, please delete the paragraph and substitute therefor:

To compress, the layer formed on the support is preferably subjected to a compressive force of at least 44 N/mm², more preferably at least 135 N/mm², most preferably at least 180 N/mm². Below 44 N/mm², the layer containing the fine conductive particles cannot be adequately compressed and it is difficult to obtain a highly conductive film. The higher the compressive force, the greater the strength of the coating and the higher the adhesion to the support. Speaking of the conductive film, it has better electrical continuity and the coating has higher strength while exhibiting stronger adhesion to the support. On the other hand, the higher the compressive force, the higher the pressure resistance [to] that the apparatus is required to withstand. Considering these factors, the compressive force is generally recommended not to

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exceed 1000 N/mm². Compressing is preferably performed at temperatures near ordinary levels (15 - 40 °C). The compressing operation that can be performed at temperatures near ordinary levels is one of the salient advantages of the invention.

IN THE CLAIMS

1. (Once Amended) A transparent conductive multi-layer structure [which comprises]. comprising:

a substrate overlaid with a support which in turn is overlaid with a conductive layer containing fine conductive particles, said multi-layer structure having a surface [resistance] resistivity of $10 - 10^3 \Omega/\Box$ and a visible light transmittance of at least 70%.

- 2. (Once Amended) The transparent conductive multi-layer structure according to claim 1, wherein the fine conductive particles are the fine particles of indium-tin oxide [(ITO)].
- 8. (Once Amended) A transparent conductive multi-layer structure [which comprises]. comprising:

a substrate overlaid with a conductive layer containing fine conductive particles, said multi-layer structure having a surface [resistance] resistivity of 10 - $10^3 \Omega/\Box$ and a visible light transmittance of at least 70%.

9. (Once Amended) The transparent conductive multi-layer structure according to claim 8, wherein the fine conductive particles are the fine particles of indium-tin oxide [(ITO)].